

PMC-EF2a

(20102)

U.S. DEPARTMENT OF ENERGY
EERE PROJECT MANAGEMENT CENTER
NEPA DETERMINATION



RECIPIENT: City of Davenport Public Library (Subrecipient of State of Iowa SEP Award)

STATE: IA

PROJECT TITLE : Eastern Avenue Branch Library Improvements

Funding Opportunity Announcement Number	Procurement Instrument Number	NEPA Control Number	CID Number
DE-FOA-0000052	DE-EE0000162		0

Based on my review of the information concerning the proposed action, as NEPA Compliance Officer (authorized under DOE Order 451.1A), I have made the following determination:

CX, EA, EIS APPENDIX AND NUMBER:

Description:

B5.1 Actions to conserve energy, demonstrate potential energy conservation, and promote energy-efficiency that do not increase the indoor concentrations of potentially harmful substances. These actions may involve financial and technical assistance to individuals (such as builders, owners, consultants, designers), organizations (such as utilities), and state and local governments. Covered actions include, but are not limited to: programmed lowering of thermostat settings, placement of timers on hot water heaters, installation of solar hot water systems, installation of efficient lighting, improvements in generator efficiency and appliance efficiency ratings, development of energy-efficient manufacturing or industrial practices, and small-scale conservation and renewable energy research and development and pilot projects. The actions could involve building renovations or new structures in commercial, residential, agricultural, or industrial sectors. These actions do not include rulemakings, standard-settings, or proposed DOE legislation.

Rational for determination:

The State of Iowa is providing \$219,890 of Recovery Act funds to Davenport Public Library for an installed ground source heat pump (GSHP) system in the new Eastern Avenue Branch Library building.

The 51-ton GSHP is a closed loop, vertical system that required 104 bore holes. The recipient states that the drilling was performed by a state licensed/certified driller and that the design has been prepared in accordance with the International Ground Source Heat Pump Association. All boreholes were grouted with a thermally enhanced bentonite grout designed to withstand cracking from the changes in temperature. System installation consisted of high density polyethylene pipe that is heat fused at the joints to minimize the risk of leaks and a non-toxic refrigerant that is a mixture of propylene glycol and potable water. The area impacted by the installation was regraded and reseeded to pre-installation condition. According to the recipient, there are no known hydrological resources affected by the ground source heat pump system. The recipient states that no runoff will be added to the storm water system. Using an infiltration pond and rain garden, the system will feed the natural wetlands that are a part of an area adjacent to the park. The recipient confirms that John Mital, Environmental Engineer of Missman Stanley Associates, Inc., Bettendorf, Iowa, prepared a Phase I Environmental Assessment of the entire property in 2006. The ESA concludes that there are no recognizable environmental conditions associated with the proposed site location. There is a letter and permit for section 404 attached from John G. Betker, Project Manager, Regulatory Branch of the Department of the Army, U. S. Corps of Engineers, in Rock Island, Illinois, giving authorization of the project with terms and conditions outlined in the letter. The project impacted approximately 2.3 acres of wetland. To mitigate the wetland impacts, the recipient is required to create approximately 2.5 additional acres of wetland, 0.92 acres of upland buffer, and preserve 2.33 acres of the existing wetland. An analysis of the National Wetland Inventory on the EPA's NEPAAssist indicates that there are no floodplains or coastal zones in proximity to the proposed site location. The site was previously used as farm land. The recipient indicated that the library's project will not create new land disturbance outside of the new building construction footprint.

The Eastern Avenue Branch Library geothermal project and related activities associated with its construction received an A9, B2.5, and B5.1 Categorical Exclusion on March 30, 2010 by the Oak Ridge Operations Office in support of the EECBG program that funded the effort. The Golden Field Office is aware that the installation of the geothermal well field is complete. A site visit was conducted and 'Strategy Verification Checklist' completed by personnel from the DOE Oak Ridge Office as part of that Office's monitoring and inspection efforts. The description of the completed geothermal well field is as follows: "We did a detailed walk over of the installed geothermal system and installation. It was very evident that the system was installed by knowledgeable individuals and three separate pressure tests had been performed to ensure that the system did not leak into the surrounding area. The number of wells installed was increased due to reduced depth of the whole well field. The system was connected but not yet operating."

In view of the 'Strategy Verification Checklist' and the post-construction assessment of project impacts report, it has been determined that the project did not have a significant impact on the environment. Accordingly, the Golden Field Office concurs with the NEPA Determination made by the Oak Ridge Operations Office. The work outlined is consistent with activities identified in Categorical Exclusion B5.1.

NEPA PROVISION

DOE has made a final NEPA determination for this award

Insert the following language in the award:

Note to Specialist :

According to the project officer, funding for this project is \$219,890. Given that this is a completed project, it is presumed that this is the final funding total for the project.

SIGNATURE OF THIS MEMORANDUM CONSTITUTES A RECORD OF THIS DECISION.

NEPA Compliance Officer Signature: _____
NEPA Compliance Officer

Date: 6/3/10

FIELD OFFICE MANAGER DETERMINATION

Field Office Manager review required

NCO REQUESTS THE FIELD OFFICE MANAGER REVIEW FOR THE FOLLOWING REASON:

- Proposed action fits within a categorical exclusion but involves a high profile or controversial issue that warrants Field Office Manager's attention.
- Proposed action falls within an EA or EIS category and therefore requires Field Office Manager's review and determination.

BASED ON MY REVIEW I CONCUR WITH THE DETERMINATION OF THE NCO :

Field Office Manager's Signature: _____
Field Office Manager

Date: _____